

## United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.usplo.gov

A DRI ICATION NO	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
APPLICATION NO.	FILING DATE	TRST NAMED INVENTOR	ATTORNET BOOKET NO.	CONTRAINTION NO.
10/659,090	09/10/2003	Christopher J. Nagel	2751.2001US2 2724	
38473 ELMORE DA	7590 02/06/2007 TENT I AW GROUP PC		EXAMINER	
ELMORE PATENT LAW GROUP, PC 209 MAIN STREET N. CHELMSFORD, MA 01863			KOPEC, MARK T	
			ART UNIT	PAPER NUMBER
			1751	
			•	
			MAIL DATE	DELIVERY MODE
			02/06/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

# SUPPLEMENTAL Notice of Allowability

Application No.	Applicant(s)		
10/659,090	NAGEL, CHRISTOPHER J.		
Examiner	Art Unit		
Mark Kopec	1751		

	Mark Kopec	1751	
The MAILING DATE of this communication appeal claims being allowable, PROSECUTION ON THE MERITS IS herewith (or previously mailed), a Notice of Allowance (PTOL-85) NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIOF the Office or upon petition by the applicant. See 37 CFR 1.313	(OR REMAINS) CLOSED in this app or other appropriate communication GHTS. This application is subject to	olication. If not include will be mailed in due	ed course. <b>THIS</b>
1. A This communication is responsive to 1.132 Dec/Remarks 1	iled 08/22/06 and Int. Summ. of 10/2	<u>//06</u> .	
2. ⊠ The allowed claim(s) is/are <u>1-6,8,14, and 27</u> .			•
3.  ☐ Acknowledgment is made of a claim for foreign priority unall All b) ☐ Some* c) ☐ None of the:  1. ☐ Certified copies of the priority documents have 2. ☐ Certified copies of the priority documents have 3. ☐ Copies of the certified copies of the priority documents have International Bureau (PCT Rule 17.2(a)).  * Certified copies not received:  Applicant has THREE MONTHS FROM THE "MAILING DATE" noted below. Failure to timely comply will result in ABANDONM THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.  4. ☐ A SUBSTITUTE OATH OR DECLARATION must be subm INFORMAL PATENT APPLICATION (PTO-152) which give 5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must (a) ☐ including changes required by the Notice of Draftspers 1) ☐ hereto or 2) ☐ to Paper No./Mail Date  (b) ☐ including changes required by the attached Examiner's Paper No./Mail Date	been received.  been received in Application No cuments have been received in this rece	national stage applicational stage applicational stage application application with the reconstruction is deficient.	quirements
Identifying indicia such as the application number (see 37 CFR 1 each sheet. Replacement sheet(s) should be labeled as such in t	.84(c)) should be written on the drawir he header according to 37 CFR 1.121(c	ngs in the front (not the d).	back) of
DEPOSIT OF and/or INFORMATION about the depo- attached Examiner's comment regarding REQUIREMENT			lote the
Attachment(s)  1. ☐ Notice of References Cited (PTO-892)  2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)  3. ☐ Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date  4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material	5. ☐ Notice of Informal P 6. ☑ Interview Summary Paper No./Mail Dat 7. ☑ Examiner's Amenda 8. ☑ Examiner's Stateme 9. ☐ Other	(PTO-413), e nent/Comment	wance
		1	-

Mark Kopec Primary Examiner

This SUPPLEMENTAL Notice of Allowability corrects the examiner's amendment mailed 02/06/07.

This action is responsive to applicant's 1.132 Declaration and Remarks filed 08/22/06. Claims 1-42 are pending.

The 1.132 Declaration filed 08/22/06 is entered. Note that a full copy of the Declaration, including the submitted color pages, has been placed in "Artifact File".

An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

At page 1 of the specification, line 3, delete "U.S. Serial No. 10/123,228, filed April 12, 2002" and replace with --U.S. Serial No. 10/123,028, filed April 12, 2002, now U.S. Patent No. 6,921,497, --.

#### Rewrite claim 1 as follows:

--1. A copper composition manufactured by exposing a starting copper composition with a purity of at least about 99.98% to an iterative cyclic process in the presence of a carbon source, wherein the manufactured copper composition is substantially

free of other metals, and characterized by one or more spots of magnetic attraction to a neodymium iron boron magnet on the surface of the composition at room temperature.--.

#### Rewrite claim 6 as follows:

--6. A copper composition manufactured by exposing a starting copper composition with a purity of at least about 99.98% to an iterative cyclic process in the presence of a carbon source, wherein the manufactured copper composition is substantially free of other metals, and characterized by point attraction to iron filings at or near 77K.--.

### Rewrite claim 14 as follows:

--14. A composition comprising copper, nickel, cobalt, iron, silicon or alloys thereof, characterized by an X-ray fluorescence analysis report wherein the report recites the presence of an element in the periodic table wherein said composition has not been in contact with said element and is manufactured by exposing a starting composition to an iterative cyclic process in the presence of a carbon source.--.

#### Rewrite claim 27 as follows:

--27. A composition comprising copper, nickel, cobalt, iron, silicon or alloys thereof, characterized by an X-ray fluorescence analysis wherein the analysis recites an emission detected at room temperature indicating the presence of an element in the periodic table wherein said

composition has not been in contact with said element and is manufactured by exposing a starting composition to an iterative cyclic process in the presence of a carbon source.--.

Cancel claims 7, 9-13, 15-26, and 28-42.

Authorization for this examiner's amendment was given in a telephone interview with Carolyn S. Elmore on 10/02/06.

The following is an examiner's statement of reasons for allowance:

Note that basis for the claimed purity range in instant claims 1 and 6 can be found at (at least) examples 1 and 11-13.

The 1.132 Declaration and accompanying remarks are sufficient to overcome the pending rejections.

With respect to instant claims 1-5, 6 and 8, applicant has demonstrated that the claimed magnetic properties have been observed (to at least some extent) in four of the five inventive examples utilizing ≥99.98% pure copper as a starting material. Support for this limitation appears (at least) in Examples 1 and 11-14. The 1.132 Declaration clearly discloses radial magnetic attraction to a Nd/B/Fe magnet (at 298K) and attraction to Fe filings (at 77K). After careful consideration of the evidence as a whole, the examiner agrees applicant has demonstrated that

Page 5

Art Unit: 1751

the disclosure, as filed, would have enabled the claimed invention for one skilled in the art at the time of filing.

With respect to the prior art rejections over these claims, each of the reference relied upon teaches Cu-Fe alloys with varying amounts of Fe responsible for magnetic behavior. As stated by applicant at page 11 of the response filed 08/22/06, the instant claims do not include the amounts of iron distributed through the prior art material(s) to achieve magnetism, nor is there any reason/motivation for removing iron from the prior art compositions to arrive at the instant claims.

With respect to instant claims 14, 17-27 and 30, the 1.132 Declaration filed 08/22/06 corrects the deficiencies of the earlier filed 1.132 Declaration (03/27/06). Specifically, applicant has clearly set forth the detailed procedure used to produce each of the independently tested samples, as well as a complete discussion of the analytical techniques utilized during testing. The manufacturer's specification(s) and GD-MS analysis of the starting materials is also provided.

Applicant's description of "cycle" and "cyclic process" at pages 15-17 of the instant specification are noted. After consideration of the evidence as a whole, including the many factors discussed in detail in In re Wands, 858 F.2d 731, 737, 8 USPQ2d 1400, 1404 (Fed. Cir. 1988), the examiner agrees

applicant has demonstrated that the disclosure as filed (as evidenced by the submitted 1.132 Declaration) would have enabled the skilled artisan to make and use claimed invention.

Page 6

It should be noted that the instant claims are drawn to existing materials that exhibit novel properties. As acknowledged by applicant at pages 10-11 of the response filed 03/27/06:

The applicant has presented 14 working examples with detailed XRF analysis that showed each of the manufactured ingots contains a different elemental signature from its corresponding natural occurring metal state. There is no basis to conclude that the result is explained by impurities or the transmutation of metals. The manufactured ingots arte still the same starting material, but exhibit different electronic state scans fro the original precursor in the GMS, XRF, PIXE, and GDOES analysis. Confirmation of these analysis from third party companies for the copper ingot is attached as a 1.132 Declaration (emphasis added).

As is evident from the prosecution history of this application and the parent application(s), the instant application disclosure proposes unproven scientific theory that may be construed as contrary to commonly accepted theories regarding quantum mechanics and interactions between various forms of matter. The instantly proposed theory includes changing the atomic orbitals of matter, as well as the introduction and definition of the terms "zurn" and "isozurn".

However, differences between the claimed materials and the prior art materials could be result of atomic interactions which may be described and predicted by the current and well-explored theories regarding the behavior of materials.

Allowance of the instant claims should not be construed as a validation by the United States Patent Office of applicant's unproved scientific theories. Applicant has demonstrated that the claimed materials (produced by specific heating and cooling operations under particular atmospheric conditions) are patentably different from the prior art of record. The provided 1.132 Declaration discloses third party confirmation of the claimed properties. The instant claims are enabled as the skilled artisan could follow the disclosed heating and cooling steps delineated by applicant in order to make and use the instantly claimed materials. Furthermore, the invention has at least one credible utility as disclosed in the specification and prior art. See, e.g., Raytheon v. Roper, 724 F.2d 951, 958, 220 USPQ 592, 598 (Fed. Cir. 1983), cert. denied, 469 U.S. 835 (1984).

The provisional obviousness-type double patenting rejections are withdrawn as the only remaining rejection(s). See MPEP 804.

Accordingly, the instant claims are allowed.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mark Kopec whose telephone number is (571) 272-1319. The examiner can normally be reached on Monday - Friday from 9:30 AM to 6:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Douglas McGinty can be reached on (571) 272-1029. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Application/Control Number: 10/659,090 Page 9

Art Unit: 1751

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Mark Kopec
Primary Examiner
Art Unit 1751

MK March 13, 2007